

AMENDMENTS TO THE CLAIMS

Please amend the claims as follows:

1. (Currently Amended) In a storage system having a plurality of storage
5 devices communicatively connected by a ring-type communication network, a
method of locating a failed device, comprising:
 - (a) disabling network access for all devices on the communication
network by transmitting a disable signal on a communication bus separate
from the communication network;
 - 10 (b) iteratively performing the following steps until communication on
the ring-type network is restored:
 - (1) enabling network access for a subset of devices on the
communication network,
 - (2) testing communication on the communication network, and
 - 15 (3) if communication on the communication network fails, then
disabling network access for the subset of devices; and
 - (c) if communication on the communication network is restored, then
enabling network access for individual devices on the communication
network until the addition of a device causes the communication network to
20 fail.
2. Canceled.
3. (Original) The method of claim 1, wherein the step of disabling
network access for all devices on the communication network comprises
closing bypass circuits to disconnect the devices from the communication
25 network.
4. (Original) The method of claim 1, wherein the step of enabling network
access for a subset of devices in a communication network comprises
transmitting an enable signal on a communication bus separate from the
communication network.

5. (Original) The method of claim 1, wherein the step of enabling network access for a subset of devices in a communication network comprises opening bypass circuits to connect the devices to the communication network.
- 5 6. (Original) The method of claim 5, wherein on the first iteration the enable signal opens the bypass circuits on all devices assigned an even address.
7. (Original) The method of claim 5, wherein on the second iteration the enable signal opens the bypass circuits on all devices assigned an odd
- 10 address.

8. (Currently Amended) A system for locating a failed device in a computer-based information storage system, the storage system including a plurality of storage devices communicatively connected by a ring-type communication network comprising:

5 at least one controller connected to the communication network and connected to an input/output module for regulating access to the communication network by the storage devices;

a processor executing logic for generating a signal for disabling network access for all storage devices on the communication network and for
10 transmitting the signal on a communication bus separate from the communication network;

a processor executing logic for iteratively performing the following steps until communication on the ring-type network is restored:

(1) generating a signal for enabling network access for a subset
15 of devices on the communication network,

(2) transmitting the signal to the input/output module on a communication bus separate from the communication network,

(3) testing communication on the communication network; and

20 (4) if communication on the ring-type network fails, then disabling network access for the subset of storage devices; and

a processor executing logic for enabling network access for individual devices on the ring-type network until the addition of a storage device causes
25 the ring-type network to fail.

9. (Original) The system of claim 8, wherein:

the devices are arranged in enclosures disposed on shelves of a networking storage cabinet; and

a cabinet bus provides a communication link to the storage devices
30 separate from the communication network.

10. (Original) The system of claim 8, wherein:

the communication network is a FCAL.

11. (Currently Amended) A computer program product in a computer readable medium for locating a failed device in a computer-based information storage system, comprising:
- first instructions for disabling network access for all storage devices on
- 5 the communication network by transmitting a disable signal on a communication bus separate from the communication network;
- second instructions for iteratively performing the following steps until communication on the communication network is restored:
- enabling network access for a subset of devices on the
- 10 communication network;
- testing communication on the communication network, and
- if communication on the communication network fails, then disabling network access for the subset of devices; and
- third instructions for enabling network access for individual
- 15 devices on the communication network until the addition of a device causes the communication network to fail.

12. (Currently Amended) In a storage system comprising a plurality of devices residing in a plurality of enclosures and communicatively connected by a ring-type network, a method of locating a failed device, comprising:
- 5 sequentially, on an enclosure-by-enclosure basis, disabling network access for all devices in enclosures on the ring-type network until communication on the ring-type network is restored;
- 10 sequentially, on an enclosure-by-enclosure basis, enabling network access for individual devices on the ring-type network by transmitting an enable signal on a communication bus separate from the communication network until the addition of a device causes communication on the network to fail.
13. (New) The method of claim 1, wherein:
- 15 the storage system comprises a plurality of disk drives contained within a cabinet;
- the cabinet includes a cabinet bus that provides an out-of-band communication path between one or more devices in the cabinet; and
- the disable signal is transmitted via the cabinet cable.
- 20 14. (New) The system of claim 12, wherein:
- the storage system comprises a plurality of disk drives contained within a cabinet;
- the cabinet includes a cabinet bus that provides an out-of-band communication path between one or more devices in the cabinet; and
- 25 the disable signal is transmitted via the cabinet cable.